

Supplemental Material
**Associations between Extreme Precipitation and
Gastrointestinal-Related Hospital Admissions in Chennai,
India**

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Supplemental Material, Table S1. Risk ratios (95% CI) corresponding to hospitalization associated with precipitation (\geq 90th percentile) by cause of admission for the single-day lag model.

Lag	All-cause	GI-related	Unclassified
0	0.93 (0.89, 0.97)	0.93 (0.85, 1.01)	1.04 (0.89, 1.20)
1	0.95 (0.90, 0.99)	0.91 (0.83, 0.99)	0.97 (0.81, 1.12)
2	0.96 (0.92, 1.01)	1.00 (0.92, 1.07)	0.93 (0.77, 1.09)
3	0.98 (0.93, 1.02)	1.01 (0.93, 1.09)	0.97 (0.82, 1.13)
4	0.97 (0.93, 1.01)	1.02 (0.95, 1.10)	0.89 (0.73, 1.05)
5	0.97 (0.93, 1.01)	1.02 (0.94, 1.10)	0.88 (0.72, 1.04)
6	0.96 (0.92, 1.00)	1.10 (1.03, 1.18)	0.84 (0.68, 1.00)
7	0.95 (0.91, 1.00)	1.04 (0.96, 1.12)	0.78 (0.62, 0.95)
8	0.96 (0.92, 1.00)	1.09 (1.01, 1.16)	0.77 (0.61, 0.93)
9	0.96 (0.92, 1.00)	1.05 (0.98, 1.13)	0.76 (0.60, 0.93)
10	0.97 (0.92, 1.01)	1.09 (1.02, 1.17)	0.70 (0.53, 0.86)
11	0.96 (0.92, 1.01)	1.10 (1.02, 1.17)	0.59 (0.42, 0.76)
12	0.97 (0.93, 1.02)	1.06 (0.98, 1.14)	0.61 (0.44, 0.78)
13	0.98 (0.94, 1.03)	1.07 (0.99, 1.14)	0.67 (0.51, 0.84)
14	1.00 (0.96, 1.04)	1.08 (1.01, 1.16)	0.75 (0.58, 0.92)
15	1.02 (0.98, 1.06)	1.14 (1.07, 1.22)	0.75 (0.58, 0.92)

All models control for daily average apparent temperature, day of week and time. Cases were defined as GI-related if the primary, secondary, or tertiary ICD-10 code was listed as intestinal infectious disease (A00-A09), helminthiases (B65-B83), or GI-related symptoms (R11-nausea and vomiting, R50-fever, R51-headache).

Supplemental Material, Table S2. Excluding 2004, risk ratio corresponding to hospitalization associated with precipitation (≥ 90 th) percentile) by cause of admission and across age categories for distributed lag model.

	Cause of admission	Cumulative RR (95% CI)
All ages	All-cause	0.85 (0.72, 1.01)
	GI-related	1.09 (0.79, 1.51)
	Unclassified	0.04 (0.02, 0.11)
Young (≤ 5)	All-cause	0.72 (0.52, 0.99)
	GI-related	2.71 (1.27, 5.78)
	Unclassified	0.19 (0.03, 1.49)
Old (≥ 65)	All-cause	0.82 (0.63, 1.07)
	GI-related	1.37 (0.76, 2.49)
	Unclassified	0.07 (0.01, 0.36)
Intermediate (6-64)	All-cause	0.88 (0.74, 1.05)
	GI-related	1.14 (0.80, 1.61)
	Unclassified	0.02 (0.01, 0.06)

All models control for daily average apparent temperature on the day of hospitalization, day of week and time. Cases were defined as GI-related if the primary, secondary, or tertiary ICD-10 code was listed as intestinal infectious disease (A00-A09), helminthiasis (B65-B83), or GI-related symptoms (R11-nausea and vomiting, R50-fever, R51-headache).